

How To Protect NW AS Java Against OOM Errors Due to Too Many UWL Items

Applicable Releases:

SAP NetWeaver 7.0

IT Practice:

User Productivity Enablement

IT Scenario:

Enterprise Knowledge Management

Version 1.0

May 2009

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Document History

| Document Version | Description |
|-------------------------|--------------------|
|-------------------------|--------------------|

| | |
|------|--------------------------------------|
| 1.00 | First official release of this guide |
|------|--------------------------------------|

Typographic Conventions

| Type Style | Description |
|-------------------------|--|
| <i>Example Text</i> | Words or characters quoted from the screen. These include field names, screen titles, pushbuttons labels, menu names, menu paths, and menu options. Cross-references to other documentation |
| Example text | Emphasized words or phrases in body text, graphic titles, and table titles |
| Example text | File and directory names and their paths, messages, names of variables and parameters, source text, and names of installation, upgrade and database tools. |
| Example text | User entry texts. These are words or characters that you enter in the system exactly as they appear in the documentation. |
| < Example text > | Variable user entry. Angle brackets indicate that you replace these words and characters with appropriate entries to make entries in the system. |
| EXAMPLE TEXT | Keys on the keyboard, for example, F2 or ENTER. |

Icons





| Icon | Description |
|---|-----------------------|
|  | Caution |
|  | Note or Important |
|  | Example |
|  | Recommendation or Tip |

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1. Scenario

In some customer scenarios in the SAP NetWeaver Portal - Knowledge Management the number of work items in the Universal Worklist (UWL) can increase to an extremely high amount. On the one hand side this could lead to performance issues and on the other it could even lead to out of memory issues on your SAP NetWeaver Application Server Java. The main reason is that the UWL cannot handle an extremely high amount of work items. If a certain amount of work items is reached it could lead to the above described behaviors.

It is important to understand that the UWL is designed as an inbox to receive e.g. notifications and tasks which should be followed-up immediately like completing them or performing the required next steps. It doesn't provide any archiving functionality and shouldn't be used as the same in order to avoid the above described issues. The idea is a single point of entry for notifications and tasks which require immediate actions. If you use it in this way the UWL works as expected.

What's now a typical scenario which could lead to an overload of the SAP NetWeaver Portal?

An end user hasn't maintained its KM notifications for quite a long time and there is meanwhile a huge amount of KM notifications in its notification inbox. In exceptional cases (more than 10.000 entries) this could even lead to out of memory issues on the SAP NetWeaver Portal Server and subsequently to a crash of the Portal.

In order to avoid an overload of the UWL with too many work items or if you experience a bad performance it is highly recommended to take up following actions to keep the amount of work items as low as possible. The following actions / tasks describe ways to keep the amount of work items on a low level on the one hand and to deal with some bottlenecks e.g. displaying UWL items on the other.

Actions / steps which can be performed in order to avoid an overload of the UWL:

- Usage of corresponding clean-up report
- Limit the maximum amount of work items / reduce the amount of work items
- Limit UWL view configuration
- Reducing notification channels
- Mass-deletion of KM action inbox notifications

In the next chapters it is described in detail how to implement all this steps in your system landscape. In some scenarios it is only required to implement a subset of the above mentioned actions which mainly depends on your usage of the UWL.

2. Prerequisites

2.1 Software Requirements

- SAP NetWeaver Portal 7.0

2.2 Required Documentation / Knowledge

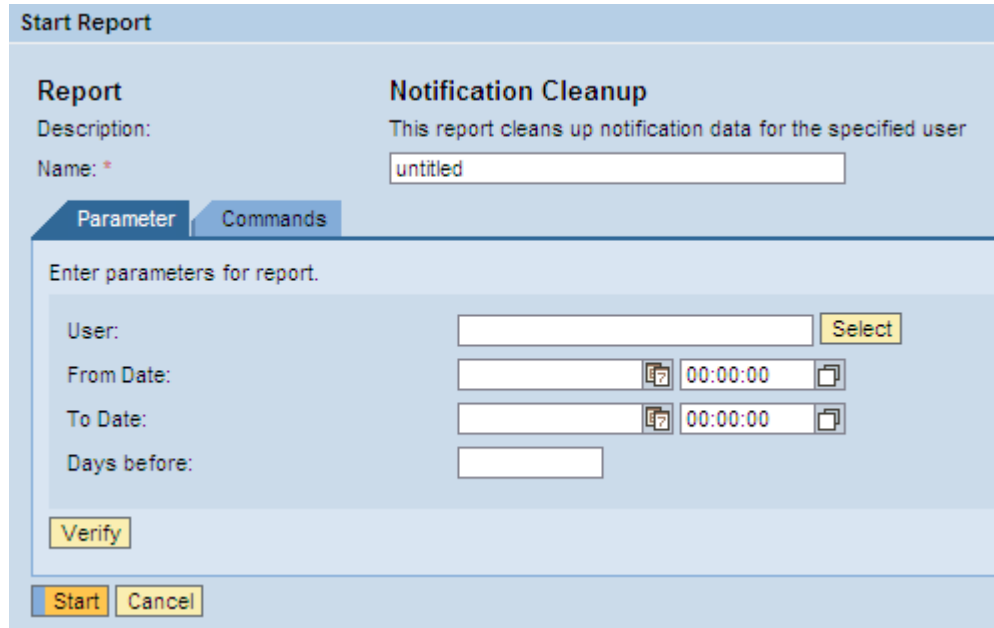
You should be familiar with the administration of SAP NetWeaver Portal and SAP NetWeaver Application Server Java to follow the instructions in this How-To Guide.

3. Clean-up of notifications via Report

The KM provides the “Notification Cleanup” report to delete notifications from the UWL for specific users. It is recommended to run this report on a regularly basis for users which have been deleted or which aren’t longer in use. In the report you can either specify a time interval by specifying a from and a due date or you can also define a number of days.

You can find the report in following location:

Content Administration > KM Content > Toolbox > Reports > Content Administration > User related Cleanup > Notification Cleanup



Start Report

Report
Description: **Notification Cleanup**
This report cleans up notification data for the specified user
Name: *

Parameter **Commands**

Enter parameters for report.

User:

From Date:

To Date:

Days before:

 **Note**

You can find further information on how to use the report in the [SAP standard documentation](#).

4. Limit / reduce amount of work items

In order to avoid out of memory issues on your NetWeaver AS Java you should consider implementing following two notes provided by SAP:

 **Important**

The implementation of the following notes is a prerequisite for some steps which are explained in this How-To Guide.

4.1 1280230 – “OutOfMemory because of too many ActionInbox items”

This note deals with out of memory issues due to too many action inbox items. In order to avoid these kind of issues it is recommended to keep the amount of action inbox items as low as possible as a workaround.

 **Note**

This note is only applicable for following SAP NetWeaver versions:

SAP NetWeaver 04 up to SPS 23

SAP NetWeaver 7.0 (formerly named 2004s) SPS 09 to SPS 18

4.2 1280393 – “ConnectorFilter for ItemsResult in UWL”

When you call the UWL and it contains a huge amount of action inbox items it could lead to an increased response time and in some exceptional cases even to out of memory issues. This note explains how to implement a maximum amount of result items and how to implement a filter for UWL items in order to limit the amount of result items.

Note

This note is only applicable for following SAP NetWeaver versions:

Netweaver 7.0 SPS 19 patch 7

Netweaver 7.01 SPS 04

Netweaver 7.02 SP 00

5. Limit UWL view - configuration

In the UWL view configuration it is possible to set a parameter called “Query Date Range” to limit the results of displayed items to a certain timeframe e.g. all items from last week, last month or last year. Only items are displayed which are in the defined timeframe. Defining a short timeframe can help to reduce the load to get the items. The items get filtered by the defined query Range.

Important

Depending on your SPS level of your NW AS Java the option to set a “Query Date Range” is not available. You might have to apply the notes (1280230, 1280393) mentioned in chapter three first.

5.1 Setting limitation as a view personalization

Below the “Data Properties” with the property “Query Date Range” is shown. In order keep the load as low as possible it is recommended to set a very short timeframe. You can do this in the personalization area of the UWL View.

Data Properties

You can define the number of items to be displayed on each page

- Items To Be Displayed Per Page: 10
- Page Refresh Rate: 5 Minutes
- Query Date Range: Last Year (dropdown menu open showing: Last Month, Last Week, Last Year, Last 3 Months)
- Indicate as 'Severe' Before Due Date:
- Indicate as 'Warning' Before Due Date:
- View Filter

The filter has been applied to this view>.

5.2 Defining limitation in UWL Configuration

As explained in the last step it is possible to set the date restriction as a personalized property for each user. If you want to limit the items shown in the UWL view for every user you can also create a configuration in the UWL Configuration.

Important

If you want to enable the mass-deletion functionality of KM action inbox notifications which is described later you can elaborate the definition of the limit together with the configuration of the mass-deletion functionality.

5.2.1 Configuration (customer.filter.notification)

Below you can see the configuration for defining a queryRange as a default for the NotificationsView. In this example the queryRange is set to "LastMonth". You can set the queryRange property to following values:

- "undefined"
- "LastWeek"
- "LastMonth"
- "Last_3_Months"
- "LastYear"

in order to filter the returned work items.

```

<?xml version="1.0" encoding="utf-8"?>
<!DOCTYPE UWLConfiguration PUBLIC "-//SAP//UWL1.0//EN" 'uwl_configuration.dtd'>
<UWLConfiguration version="1.0">
  <Views>
    <View name="NotificationsView" selectionMode="MULTISELECT" width="98%"
supportedItemTypes="uwl.notification" columnOrder="subject, priority, creatorId, createdDate,
attachmentCount, detailIcon" sortBy="createdDate:descend, priority:descend"
tableDesign="STANDARD" visibleRowCount="10" headerVisible="yes" queryRange="LastMonth"
tableNavigationFooterVisible="yes" tableNavigationType="CUSTOMNAV" actionRef="" refresh="300"
dueDateSevere="0" dueDateWarning="0" emphasizedItems="unread"
displayOnlyDefinedAttributes="yes" dynamicCreationAllowed="yes" actionPosition="top"
referenceBundle="task_notifications">
      <Actions>
        <Action reference="complete"/>
        <Action reference="refresh"/>
        <Action reference="defaultGlobalWizard"/>
        <Action reference="addToNavigation"/>
        <Action reference="removeFromNavigation"/>
        <Action reference="personalize"/>
      </Actions>
    </View>
  </Views>
</UWLConfiguration>

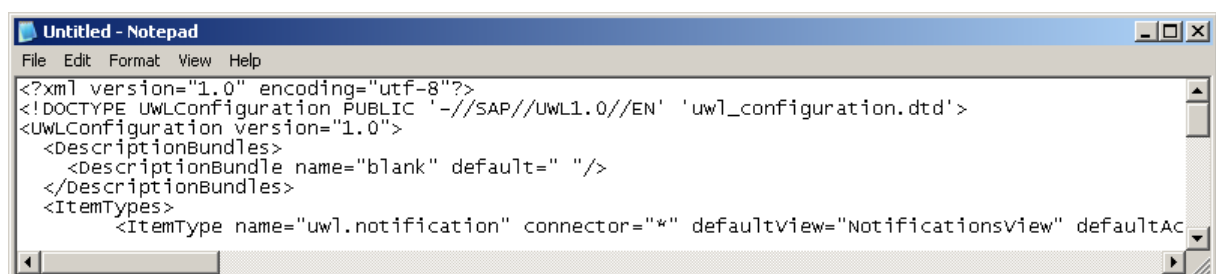
```

5.2.2 Create configuration

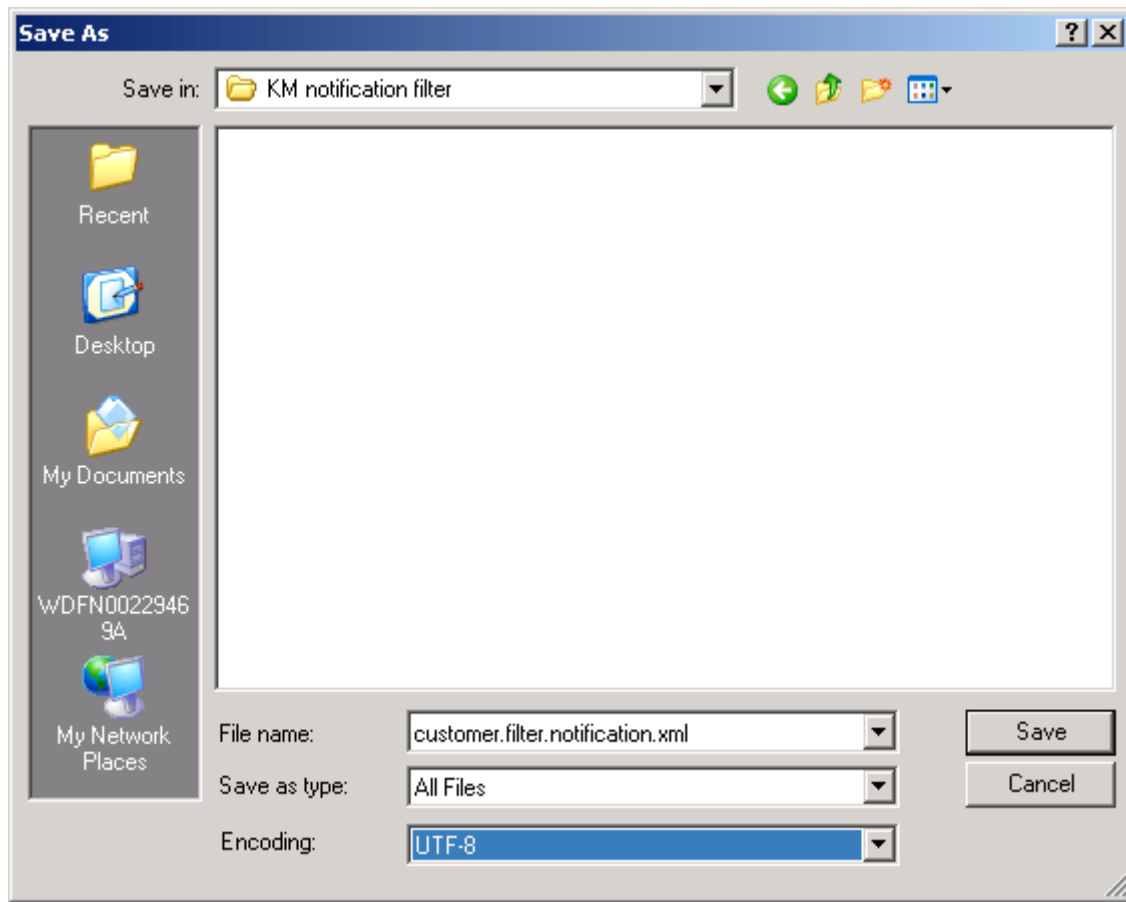
In order to apply this configuration it is required to create a custom configuration. The following part explains step-by-step how to create this custom configuration:

5.2.2.1 Step 1 – Create XML-File

- Copy the whole content of the configuration from chapter 5.2.1.
- Paste the whole content to a text editor e.g. notepad or Notepad++ as shown in the picture



- Save the XML-File as "customer.filter.notification.xml" to any folder e.g. "My Documents"



 Important

Make sure to choose UTF-8 as Encoding.

- As a result you should have now one XML-File which contains the configuration for the NotificationsView

5.2.2.2 Step 2 – Upload XML-File (Configuration)

- Logon to your SAP NetWeaver Portal
- Navigate to following location and click on link:
 - System Administration → System Configuration → Universal Worklist & Workflow → Universal Worklist - Administration → Universal Worklist Content Configuration → Link: Click to Manage Item Types and View Definitions

Universal Worklist Systems

Here you can define connections to systems as item providers for the Universal Worklist. The 'Conn system as defined in the system landscape. For the connector types 'WebFlowConnector' or 'AlertC configure Web Dynpro applications on a different WAS to the WAS for the system alias, then that sy

| System Alias | Connector Type | Action | Activate Conn |
|--------------|------------------------|--------|---------------|
| AdHocSystem | AdHocWorkflowConnector | | Deactivate |
| ActionInbox | ActionInboxConnector | | Deactivate |

New Edit Delete

Register Item Types for All Systems Register Item Types for New Systems Only

Item type retrieval and registration requires a connection to the systems and may take a couple of m For each system, they are generated as the configuration named 'uwl.webflow.<system_alias>' or After configuration changes in the backend system, you must re-register the system.

Universal Worklist Content Configuration

[Click to Manage Item Types and View Definitions](#)

After configuration changes, SAP recommends clearing the persistent cache on the: [Cache Admini](#)

- Choose tab “Upload New Configuration”

Universal Worklist Configuration Content

You can administrate Universal Worklist configuration content (in XML) here. You can set up provider systems and connectors in: For troubleshooting the configuration content [click here](#)

Current Configurations **Upload New Configuration** Reset Personalizations

You can upload the XML configuration on this page.

Configuration Name:

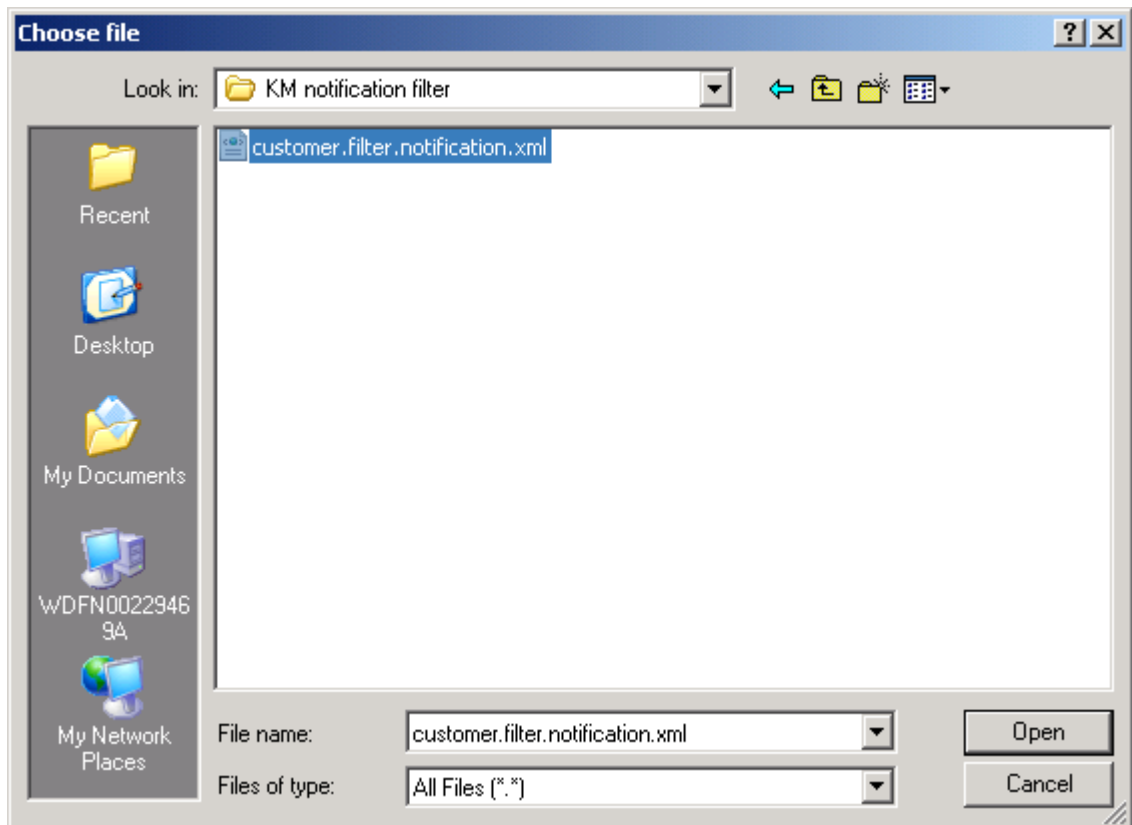
Choose a Valid XML or ZIP File: Browse...

High Priority:

Adapt to System: ▼

Upload

- Specify the Configuration parameters
 - Specify the Configuration Name e.g. “customer.filter.notification”
 - Press “Browse...” Button to choose your XML-File
 - Choose the XML-File created in step 1 e.g. “customer.filter.notification.xml”
 - Press the “Open” Button as shown in the picture below

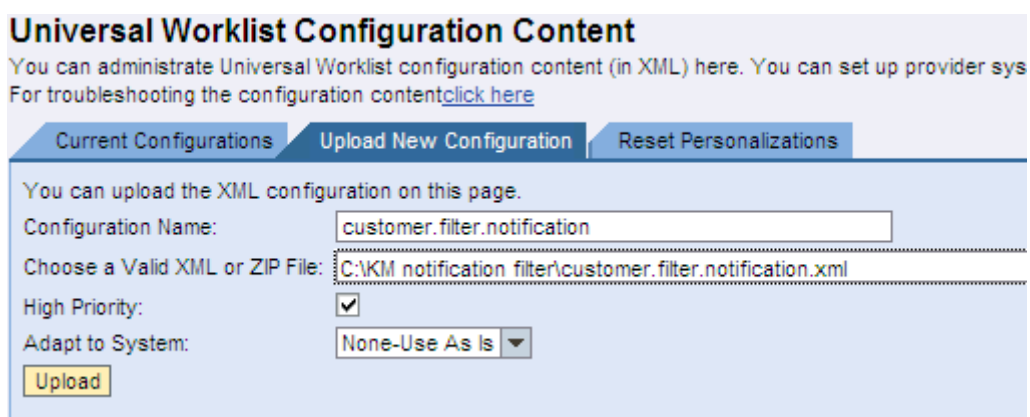


- o Enable the checkbox for “High Priority”

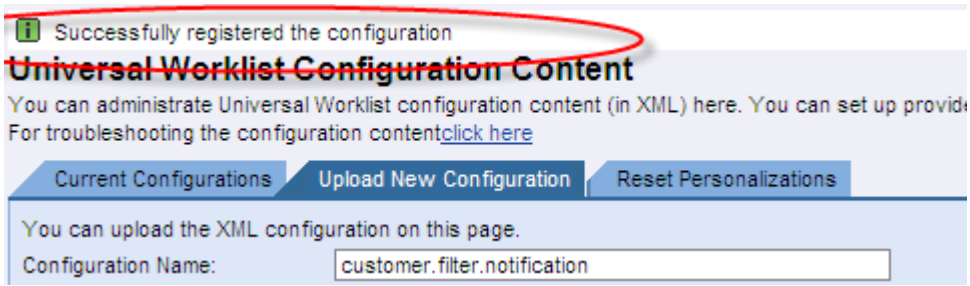
 Important

This checkbox has to be enabled as the UWL Configuration Content considers the configurations with the highest priority first. Otherwise it might lead to a conflict with the standard configuration.

- o Your “Upload New Configuration” dialog should now look like the following:

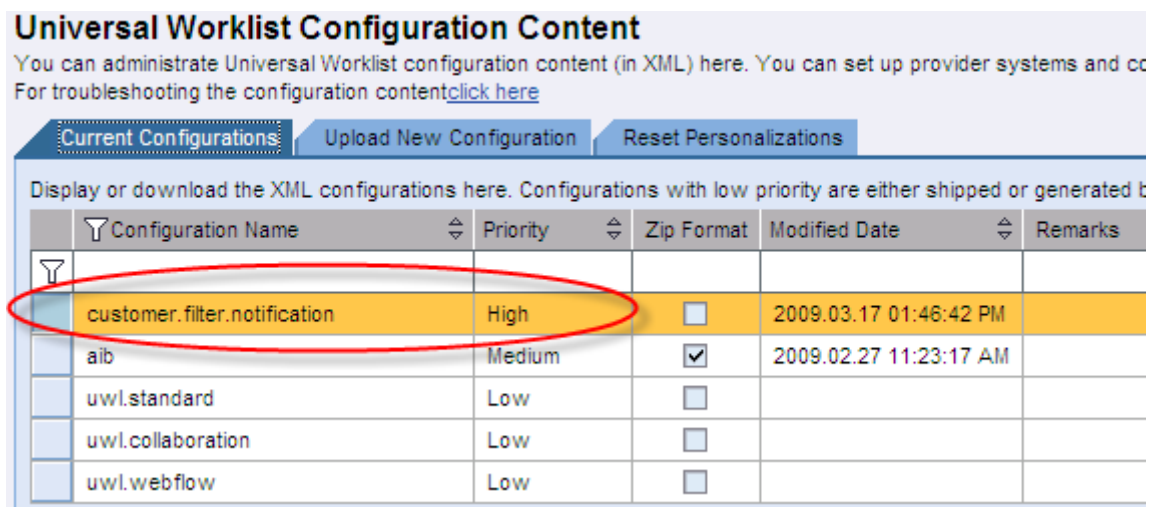


- o In order to finalize the “Upload New Configuration” press the “Upload” Button as shown in the picture above
- o As a result you should get the message “Successfully registered the configuration”



5.2.2.3 Step 3 – Check Configuration

- Switch to tab “Current Configurations”
- You should now see a new configuration e.g. “customer.filter.notification”



6. Reducing notification channels

You can reduce the number of notification channels in the Subscription Service e.g. E-Mail notification or SMS notification.

Note

For navigating to the Subscription Service go to: System Administration → System Configuration → Knowledge Management → Content Management → Configuration → Content Management → Repository Services → Show Advanced Options → Subscription Service → subscription

The following configuration screen provides several options to configure the Subscription Service. Below you can see the standard settings of the subscription:

View "subscription"

Send AdminNotifications to Action Inbox :

Send Notifications to Action Inbox :

Originators: *

| Name |
|------------------------------------|
| subscription.EMAIL |
| subscription.SMS |

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Allowed AdminNotifications:

Service User:

Subscription Service ID in database:

[Show Advanced Options](#)

The parameters "Send AdminNotifications to Action Inbox" and "Send Notifications to Action Inbox" are enabled by default. Due to these standard settings every subscription generates an item in the Action Inbox. In order to reduce the amount of generated items in the Action Inbox you can disable these options as the users are anyway informed by other notification channels e.g. E-Mail notification or SMS notification.

In order to change the parameters press the "Edit" Button to switch to the edit mode. Disable the options mentioned above and save your changes by pressing the "OK" Button. After applying the new settings the users are not longer informed by additional items in the Action Inbox. Instead the only channel which is used from now on is notification by E-Mail and / or by SMS.

Edit "subscription"

Object remains locked until you click OK or Cancel

Send AdminNotifications to Action Inbox :

Send Notifications to Action Inbox :

Originators: *

| Name |
|---|
| <input type="checkbox"/> notificator.EMAIL |
| <input checked="" type="checkbox"/> subscription.EMAIL |
| <input checked="" type="checkbox"/> subscription.SMS |
| <input type="checkbox"/> subscription_collaboration.EMAIL |
| <input type="checkbox"/> subscription_collaboration.SMS |

Page 1 / 1

Allowed AdminNotifications:

Service User:

Subscription Service ID in database:

[Show Advanced Options](#)

7. Mass delete functionality for KM action inbox notifications in the UWL

In some customer scenarios in the SAP NetWeaver Portal - Knowledge Management area it is required to trigger a mass-deletion of KM action inbox notifications in the Universal Worklist (UWL). In the SAP standard mass deletion is only possible for R/3 notifications by default.

In the next chapters it is explained how to enable / configure the mass-deletion functionality of the Universal Worklist for KM action inbox notifications. It will activate the multi select capability and multi delete functionality for the end-users UWL view for action inbox items.

Features supported after applying this guide:

1. Multi select capability for UWL notification items
2. Multi delete functionality for KM action inbox items

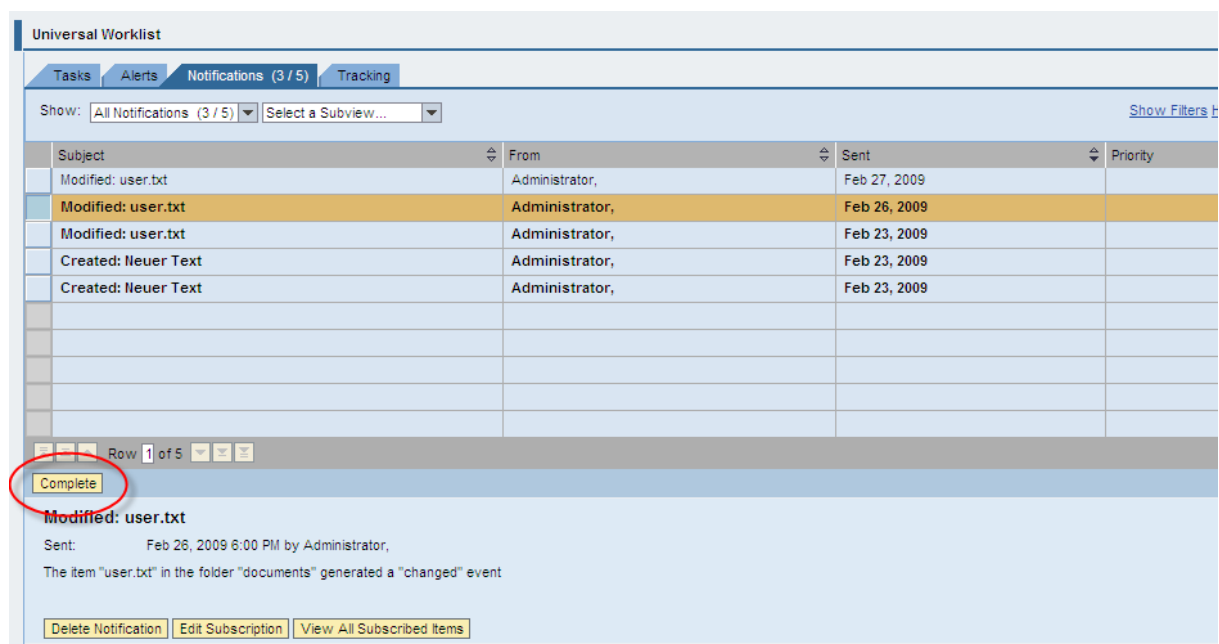
7.1 UWL NotificationsView in Standard

7.1.1 Standard NotificationsView

As shown below you see the standard NotificationsView in the Universal Worklist for completing the notifications. When you trigger or press the "Complete" Button only the R/3 notifications are deleted and it is only possible to select a single notification not multiple ones.

Note

For navigating to the Universal Worklist go to: Home → Work → Universal Worklist → tab Notifications in your NetWeaver Portal



The screenshot shows the Universal Worklist interface with the following data:

| Subject | From | Sent | Priority |
|---------------------|----------------|--------------|----------|
| Modified: user.txt | Administrator, | Feb 27, 2009 | |
| Modified: user.txt | Administrator, | Feb 26, 2009 | |
| Modified: user.txt | Administrator, | Feb 23, 2009 | |
| Created: Neuer Text | Administrator, | Feb 23, 2009 | |
| Created: Neuer Text | Administrator, | Feb 23, 2009 | |

At the bottom of the table, there is a "Complete" button circled in red. Below the table, the details for the selected notification are shown:

Modified: user.txt
 Sent: Feb 26, 2009 6:00 PM by Administrator,
 The item "user.txt" in the folder "documents" generated a "changed" event

Buttons at the bottom: Delete Notification, Edit Subscription, View All Subscribed Items

7.1.2 Standard Configuration

The standard appearance of the Universal Worklist NotificationView is defined in the Configurations aib and uwl.standard which can be found in the following location:

System Administration → System Configuration → Universal Worklist – Administration → Universal Worklist Content Configuration → Link: Click to Manage Item Types and View Definitions

Universal Worklist Configuration Content
 You can administrate Universal Worklist configuration content (in XML) here. You can set up provider systems and connect For troubleshooting the configuration content [click here](#)

Current Configurations | Upload New Configuration | Reset Personalizations

Display or download the XML configurations here. Configurations with low priority are either shipped or generated by the

| Configuration Name | Priority | Zip Format | Modified Date | Remarks |
|--------------------|----------|-------------------------------------|------------------------|---------|
| aib | Medium | <input checked="" type="checkbox"/> | 2009.02.27 11:23:17 AM | |
| uwl.standard | Low | <input type="checkbox"/> | | |
| uwl.collaboration | Low | <input type="checkbox"/> | | |
| uwl.webflow | Low | <input type="checkbox"/> | | |

7.1.2.1 Configuration: aib

Below you see a snippet of the aib configuration which defines the standard action “com.sap.km.massdeleteltem”. This action has to be referenced in the NotificationsView and in the “uwl.notification” in order to enable the mass-deletion for KM notifications.

...

```
<Action name="com.sap.km.massdeleteltem" groupAction="no" handler="com.sap.km.aib"
referenceBundle="km.action.mass.delete" returnToDetailViewAllowed="yes"
launchInNewWindow="no">
```

```
<Properties>
```

```
<Property name="display_order_priority" value="uwlExcludeFromPreviewDetail"/>
```

```
</Properties>
```

```
<ConfirmDescriptions referenceBundle="delete_prompt"/>
```

```
</Action>
```

...

7.1.2.2 Configuration: uwl.standard

The uwl.standard configuration for the uwl.notification ItemType and for the NotificationsView definition has to be extended by a reference to the action com.sap.km.massdeleteltem. Below you can see a snippet of the standard configuration. As it is not possible to modify the standard configuration directly it is therefore required to create a custom configuration to overwrite the standard configuration. In the Step-by-step procedure it is explained in detail how to do that.

...

```
<ItemType name="uwl.notification" connector="*" defaultView="NotificationsView"
defaultAction="viewDetail" executionMode="default">
```

```
  <Actions>
```

```
    <Action reference="complete"/>
```

```
  </Actions>
```

```
</ItemType>
```

...

```
<View name="NotificationsView" selectionMode="SINGLESELECT" width="98%"
supportedItemTypes="uwl.notification" columnOrder="subject, creatorId, createdDate, priority,
attachmentCount" sortBy="createdDate:descend, priority:descend" tableDesign="STANDARD"
visibleRowCount="10" headerVisible="no" queryRange="undefined" tableNavigationFooterVisible="yes"
tableNavigationType="CUSTOMNAV" actionRef="" refresh="300" dueDateSevere="0"
dueDateWarning="0" emphasizedItems="unread" displayOnlyDefinedAttributes="yes"
dynamicCreationAllowed="yes" actionPosition="bottom" referenceBundle="task_notifications">
```

```
  <Actions>
```

```
    <Action reference="complete"/>
```

```
    <Action reference="addToNavigation"/>
```

```
    <Action reference="removeFromNavigation"/>
```

```
    <Action reference="personalize"/>
```

```
  </Actions>
```

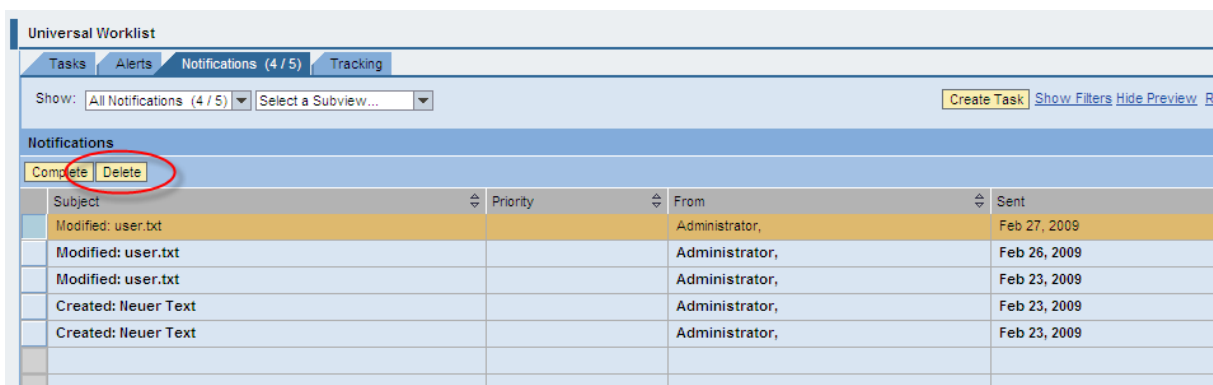
```
</View>
```

...

7.2 Enhanced UWL NotificationsView

7.2.1 Enhanced NotificationsView

Below you can see a picture of the enhanced NotificationsView which contains a new "Delete" Button for mass-deletion of KM notifications. As soon as you have completed the Step-by-Step procedure which you can find below the mass-deletion functionality will be available in the NotificationsView.



The screenshot shows the 'Universal Worklist' interface with the 'Notifications' tab selected. The 'Notifications' section has a table with columns: Subject, Priority, From, and Sent. The table contains five rows of notifications. Above the table, there are two buttons: 'Complete' and 'Delete'. The 'Delete' button is circled in red, indicating the new mass-deletion functionality.

| Subject | Priority | From | Sent |
|---------------------|----------|----------------|--------------|
| Modified: user.txt | | Administrator, | Feb 27, 2009 |
| Modified: user.txt | | Administrator, | Feb 26, 2009 |
| Modified: user.txt | | Administrator, | Feb 23, 2009 |
| Created: Neuer Text | | Administrator, | Feb 23, 2009 |
| Created: Neuer Text | | Administrator, | Feb 23, 2009 |

7.2.2 Configuration (customer.multidelete.action)

“NotificationsView” and “uwl.notification” with additional reference to “com.sap.km.massdeleteltem”:

```
<?xml version="1.0" encoding="utf-8"?>
<!DOCTYPE UWLConfiguration PUBLIC "-//SAP//UWL1.0//EN" 'uwl_configuration.dtd'>
<UWLConfiguration version="1.0">
  <DescriptionBundles>
    <DescriptionBundle name="blank" default=" "/>
  </DescriptionBundles>
  <ItemTypes>
    <ItemType name="uwl.notification" connector="*" defaultView="NotificationsView"
defaultAction="viewDetail" executionMode="default">
      <Actions>
        <Action reference="complete"/>
        <Action reference="com.sap.km.massdeleteltem"/>
      </Actions>
    </ItemType>
  </ItemTypes>
  <Views>
    <View name="NotificationsView" selectionMode="MULTISELECT" width="98%"
supportedItemTypes="uwl.notification" columnOrder="subject, priority, creatorId, createdDate,
attachmentCount, detailIcon" sortBy="createdDate:descend, priority:descend"
tableDesign="STANDARD" visibleRowCount="10" headerVisible="yes" queryRange="undefined"
tableNavigationFooterVisible="yes" tableNavigationType="CUSTOMNAV" actionRef="" refresh="300"
dueDateSevere="0" dueDateWarning="0" emphasizedItems="unread"
displayOnlyDefinedAttributes="yes" dynamicCreationAllowed="yes" actionPosition="top"
referenceBundle="task_notifications">
      <Actions>
        <Action reference="complete"/>
        <Action reference="refresh"/>
        <Action reference="defaultGlobalWizard"/>
        <Action reference="addToNavigation"/>
        <Action reference="removeFromNavigation"/>
        <Action reference="personalize"/>
        <Action reference="com.sap.km.massdeleteltem"/>
      </Actions>
    </View>
  </Views>
</UWLConfiguration>
```

7.3 Step-by-Step Procedure

In order to enable the mass-deletion it is required to create a custom configuration in the Universal Worklist – Content Configuration. The following part explains step-by-step how to create this custom configuration:

7.3.1 Step 1 – Create XML-File

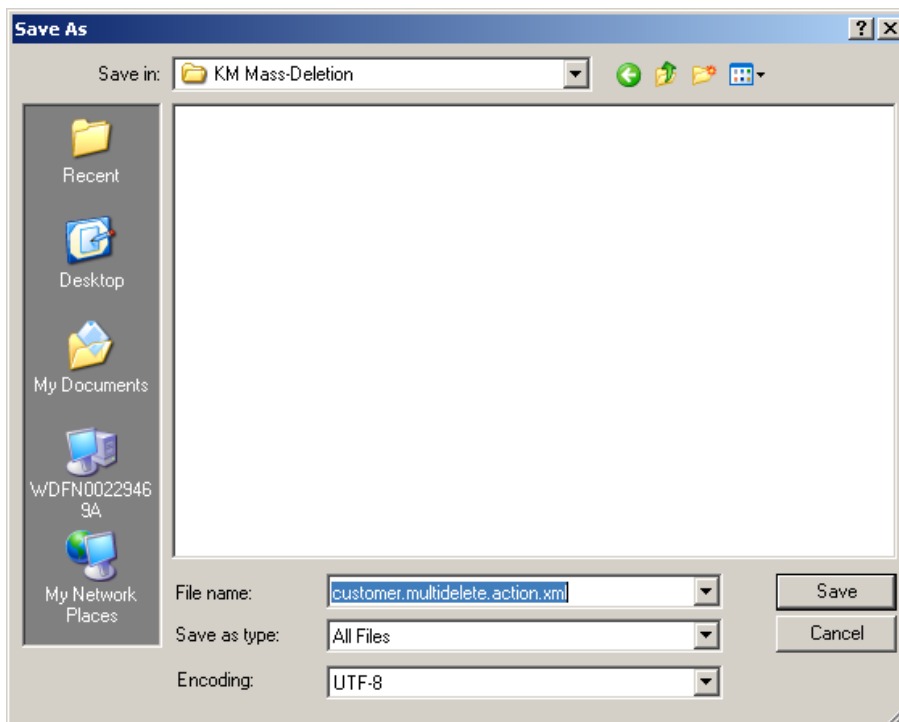
- Copy the whole content of the configuration from chapter 7.2.2
- Paste the whole content to a text editor e.g. notepad or Notepad++ as shown in the picture



```

Untitled - Notepad
File Edit Format View Help
<?xml version="1.0" encoding="utf-8"?>
<!DOCTYPE UWLConfiguration PUBLIC "-//SAP//UWL1.0//EN" 'uwl_configuration.dtd'>
<UWLConfiguration version="1.0">
  <DescriptionBundles>
    <DescriptionBundle name="blank" default=" "/>
  </DescriptionBundles>
  <ItemTypes>
    <ItemType name="uwl.notification" connector="*" defaultview="Notificationsview" defaultAc
  
```

- Save the XML-File as “customer.multidelete.action.xml” to any folder e.g. “My Documents”



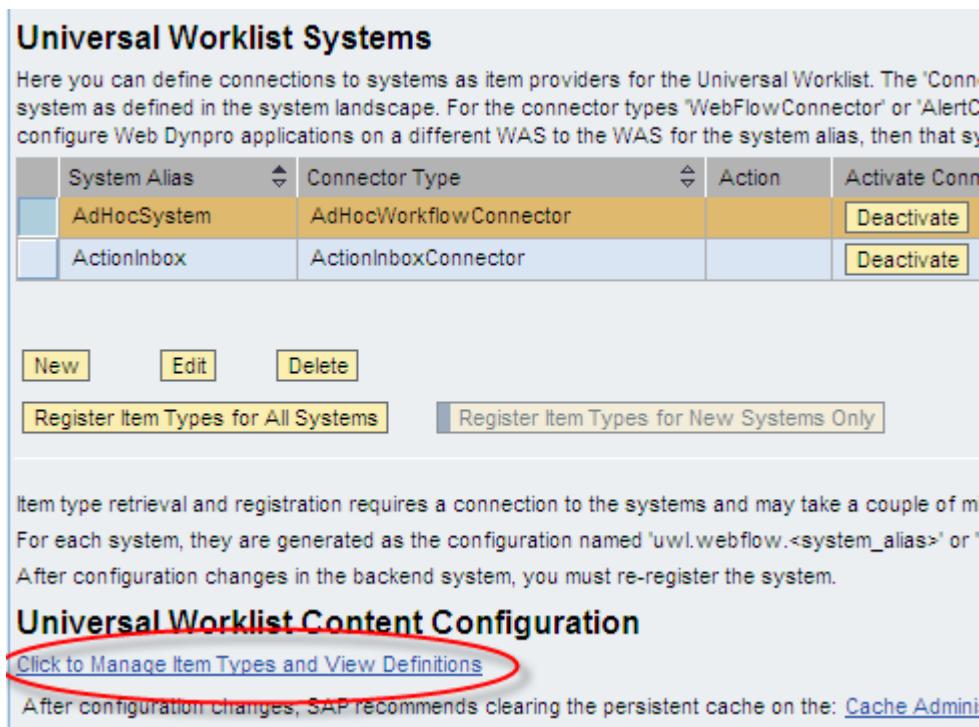
Important

Make sure to choose UTF-8 as Encoding.

- As a result you should have now one XML-File which contains the configuration for the NotificationsView

7.3.2 Step 2 – Upload XML-File (Configuration)

- Logon to your SAP NetWeaver Portal
- Navigate to following location and click on link:
 - System Administration → System Configuration → Universal Worklist - Administration → Universal Worklist Content Configuration → Link: Click to Manage Item Types and View Definitions



Universal Worklist Systems

Here you can define connections to systems as item providers for the Universal Worklist. The 'Conn system as defined in the system landscape. For the connector types 'WebFlowConnector' or 'AlertC configure Web Dynpro applications on a different WAS to the WAS for the system alias, then that sy

| System Alias | Connector Type | Action | Activate Conn |
|--------------|------------------------|--------|---------------|
| AdHocSystem | AdHocWorkflowConnector | | Deactivate |
| ActionInbox | ActionInboxConnector | | Deactivate |

New Edit Delete

Register Item Types for All Systems Register Item Types for New Systems Only

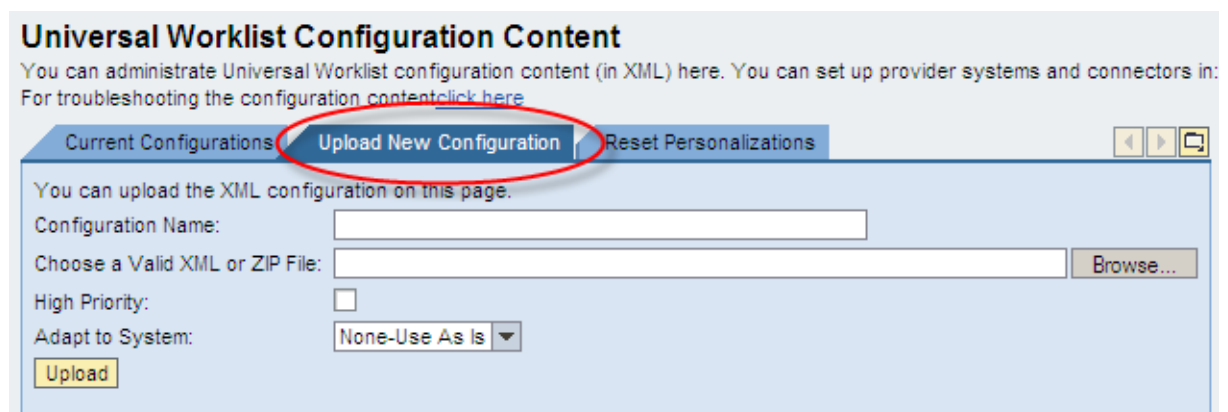
Item type retrieval and registration requires a connection to the systems and may take a couple of m For each system, they are generated as the configuration named 'uwl.webflow.<system_alias>' or After configuration changes in the backend system, you must re-register the system.

Universal Worklist Content Configuration

[Click to Manage Item Types and View Definitions](#)

After configuration changes, SAP recommends clearing the persistent cache on the: [Cache Admini](#)

- Choose tab “Upload New Configuration”



Universal Worklist Configuration Content

You can administrate Universal Worklist configuration content (in XML) here. You can set up provider systems and connectors in: For troubleshooting the configuration content [click here](#)

Current Configurations **Upload New Configuration** Reset Personalizations

You can upload the XML configuration on this page.

Configuration Name:

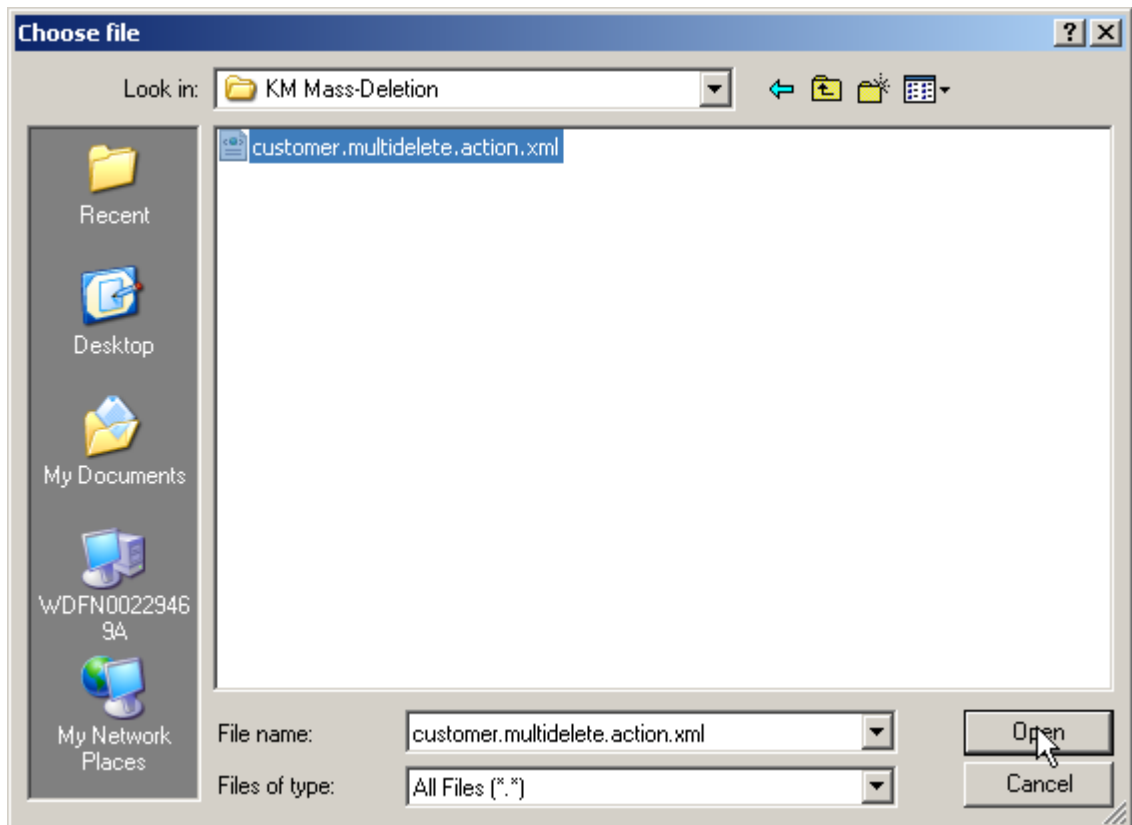
Choose a Valid XML or ZIP File: Browse...

High Priority:

Adapt to System:

Upload

- Specify the Configuration parameters
 - Specify the Configuration Name e.g. “customer.multidelete.action”
 - Press “Browse...” Button to choose your XML-File
 - Choose the XML-File created in step 1 e.g. “customer.multidelete.action.xml”
 - Press the “Open” Button as shown in the picture below

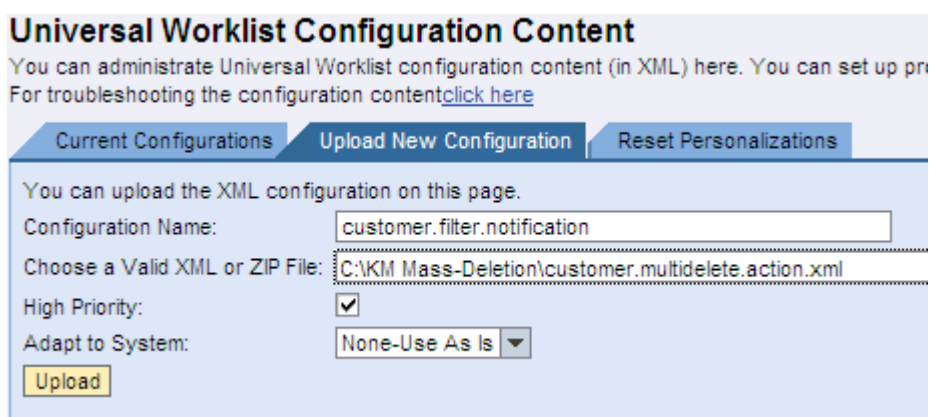


- o Enable the checkbox for “High Priority”

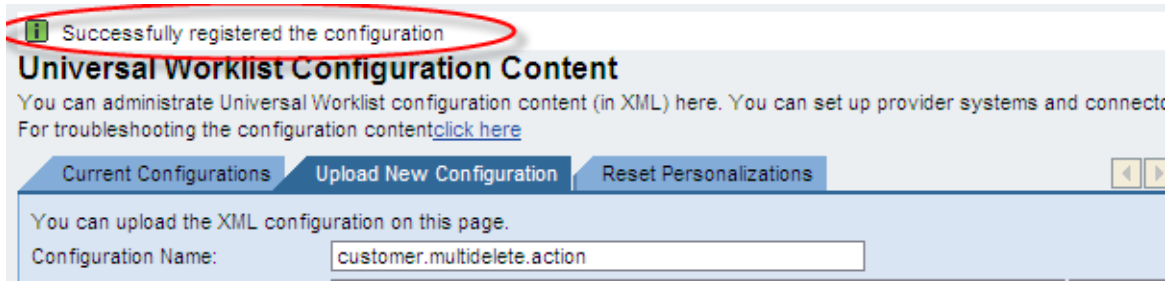
 Important

This checkbox has to be enabled as the UWL Configuration Content considers the configurations with the highest priority first. Otherwise might lead to a conflict with the standard configuration.

- o Your “Upload New Configuration” dialog should now look like the following:

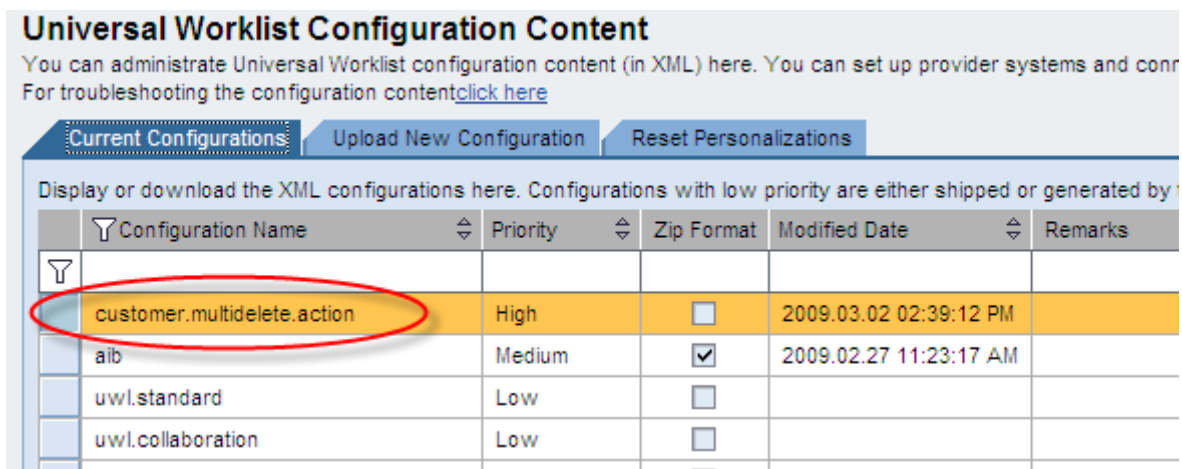


- o In order to finalize the “Upload New Configuration” press the “Upload” Button as shown in the picture above
- o As a result you should get the message “Successfully registered the configuration”



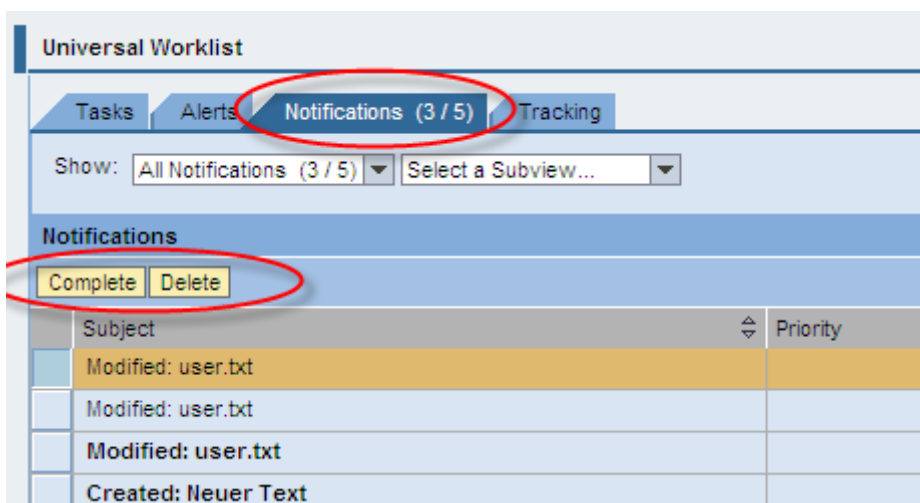
7.3.3 Step 3 – Check Configuration

- Switch to tab “Current Configurations”
- You should now see a new configuration e.g. “customer.multidelete.action”



7.3.4 Step 4 – Check enhanced NotificationsView

- Navigate to following location and check whether you have now a “Delete Button as shown in the picture below:
 - Home → Work → Universal Worklist → tab Notifications



- You have now successfully enhanced your NotificationsView by a mass-deletion functionality for KM notifications.

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